## **INTERNATIONAL SEARCH REPORT**

International application No. PCT/KR2003/001758

A. CLAS	A. CLASSIFICATION OF SUBJECT MATTER				
IPC7 H04R 1/04, H04R 19/04					
	nternational Patent Classification (IPC) or to both nation	onal classification and IPC			
	DS SEARCHED				
Minimum documentation searched (classification system followed by classification symbols)  IPC7 H04R, H01L					
Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched KR, JP: IPC as above					
Electronic data base consulted during the intertnational search (name of data base and, where practicable, search terms used)					
C. DOCUMENTS CONSIDERED TO BE RELEVANT					
Category*	Citation of document, with indication, where app	Relevant to claim No.			
A	KR 2020010216291 Y (SORI TEL., Co., Ltd.) MAR See the whole document	RCH 15, 2001	1		
A	KR 1020020039623 A (MATSUSHITA ELECTRIC See the whole document				
A	US 2002/0047173 A1 (OKAWA at. al.) APRIL 25, 2002 See Abstract, Figure 1		1, 2		
l					
Further documents are listed in the continuation of Box C. X See patent family annex.					
"A" document to be of pa	ategories of cited documents: defining the general state of the art which is not considered articular relevance	"T" later document published after the internation date and not in conflict with the application the principle or theory underlying the invent	but cited to understand		
filing date		"X" document of particular relevance; the claime considered novel or cannot be considered t	d invention cannot be		
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of citation or other special reason (as specified)		step when the document is taken alone "Y" document of particular relevance; the claims			
"O" document referring to an oral disclosure, use, exhibition or other means		considered to involve an inventive step when combined with one or more other such docubeing obvious to a person skilled in the art			
"P" document	published prior to the international filing date but later iority date claimed	"&" document member of the same patent family			
Date of the actual completion of the international search		Date of mailing of the international search report			
26 APRIL 2004 (26.04.2004)		27 APRIL 2004 (27.04.2004)			
	iling address of the ISA/KR	Authorized officer	Alexander of the second		
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## INTERNATIONAL SEARCH REPORT Information on patent family members

International application No. PCT/KR2003/001758

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Patent document cited in search report	Publication date	Patent family member(s)	Publication date
KR 2020010216291 Y	15-03-01	None	
KR 1020020039623 A	27-05-02	None	
US 2002/0047173 A1	25-04-02	None	

Form PCT/ISA/210 (patent family annex) (January 2004)